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10/789,124	02/27/2004	Robert Beverley Basham	SJO920030103US1 8774		
68431 TIMOTHY N.	7590 11/14/2007 ELLIS, PATENT ATTO		EXAMINER		
8680 VIA MALLORCA			HUSSAIN, TAUQIR		
SUITE D LA JOLLA, CA 92037		1	ART UNIT	PAPER NUMBER	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

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Office Action Summary	10/789,124	BASHAM ET AL.			
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The MAN INC DATE of this communication com	Tauqir Hussain	2152			
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply					
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA  - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period was reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tim vill apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	N. nely filed the mailing date of this communication. D (35 U.S.C. § 133).			
Status					
1) Responsive to communication(s) filed on 27 Fe	ebruary 2004.				
2a) ☐ This action is <b>FINAL</b> . 2b) ☑ This	This action is <b>FINAL</b> . 2b)⊠ This action is non-final.				
	☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is				
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims					
4) ☐ Claim(s) 1/26 is/are pending in the application.  4a) Of the above claim(s) is/are withdraw  5) ☐ Claim(s) is/are allowed.  6) ☐ Claim(s) 1-26 is/are rejected.  7) ☐ Claim(s) is/are objected to.  8) ☐ Claim(s) are subject to restriction and/or	vn from consideration.				
Application Papers					
9) The specification is objected to by the Examine 10) The drawing(s) filed on is/are: a) access applicant may not request that any objection to the Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Examine	epted or b) objected to by the Eddrawing(s) be held in abeyance. See ion is required if the drawing(s) is obj	e 37 CFR 1.85(a). jected to. See 37 CFR 1.121(d).			
Priority under 35 U.S.C. § 119					
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of: <ol> <li>Certified copies of the priority documents have been received.</li> <li>Certified copies of the priority documents have been received in Application No.</li> <li>Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> </ol> </li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>					
Attachment(s)					
1) Notice of References Cited (PTO-892)  4) Interview Summary (PTO-413)  2) Paper No(s)/Mail Date					
2) Notice of Drainsperson's Fatent Brawing Notes (170-345)  3) Information Disclosure Statement(s) (PTO/SB/08)  Paper No(s)/Mail Date 02/27/2004.  5) Notice of Informal Patent Application  6) Other:					

#### **DETAILED ACTION**

1. Claims 1-26 are pending in this application.

### Information Disclosure Statement

2. The listing of references in the specification is not a proper information disclosure statement. 37 CFR 1.98(b) requires a list of all patents, publications, or other information submitted for consideration by the Office, and MPEP § 609.04(a) states, "the list may not be incorporated into the specification (as incorporated on page12) but must be submitted in a separate paper." Therefore, unless the references have been cited by the examiner on form PTO-892, they have not been considered.

## Claim Rejections - 35 USC § 101

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

3. Claim 1-18 are rejected under 35 U.S.C 101 because the claimed invention is directed to non-statutory subject matter. Claims recite "A signal bearing medium tangibly embodying a program of a machine-readable instruction...". In the light of specification on page12, applicant is intended to cover signal bearing medium as all transmission media to name few are, network transmission line, wireless transmission media, signals propagating through space, radio waves etc. Signal is not a series of steps or acts and thus is not a process. Signal is not a physical article or object and

such is not a machine or manufacture. Signal is not a combination of substances and therefore, not a composition of matter.

## Claim Rejections - 35 USC § 112

- 4. The following is a quotation of the second paragraph of 35 U.S.C. 112:
  - The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter, which the applicant regards as his invention.
- 5. Claim 1, 19, 23 and 24 are rejected under 35 U.S.C. 112, second paragraph, as failing to set forth the subject matter which applicant(s) regard as their invention. Claim recite "merging data corresponding with at least one data aggregation determined to have a current state value that is different than a corresponding prior state value, with prior data corresponding with at least one data aggregation...." It is not clear if at least one data aggregation is same as recited earlier on line 8 of claim 1? If it is same than how a prior state can have two state at same time?

# Claim Rejections - 35 USC § 103

- 6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 7. Claims 1-26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Connor et al (Pub. No.: US 2004/0024863 A1), hereinafter, "Connor" in view of Sheehy, Jr. et al (Patent No.: US 7233957 B1), hereinafter, "Sheehy".

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8. As to claims 1, 19, 23 and 24(e.g. program product, system, method etc.), Connor discloses, signal bearing medium tangibly embodying a program of machine-readable instructions executable by a digital processing apparatus to perform operations for processing network discovery data (Connor, Abstract), the operations comprising:

defining a plurality of network data aggregations (Connor, Fig.1, elements-10a-10c, [0020], where network data storage 10a-10c are disclosed);

assigning a current state value to at least one of the data aggregations (Connor, [0008], where recently added entry is a state value which can be to the added entry in the network discovery);

for at least one current state value, determining if the current state value is different than a corresponding prior state value (Connor, [0009], where final state pass state detection means state value between first and final is obviously different since there has been an added entry before final state); and

merging data corresponding with at least one data aggregation determined to have a current state value that is different than a corresponding prior state value (Connor, Fig.3, element-58-64, [0041], where data gatherer merges the newly detected network component in the fabric which obviously changes the state value of the overall system.

Connor however is silent on disclosing explicitly, merging above data aggregation, with prior data corresponding with at least one data aggregation

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determined to have a current state value that is not different than a corresponding prior state value.

However, Sheehy discloses, merging above data aggregation, with prior data corresponding with at least one data aggregation determined to have a current state value that is not different than a corresponding prior state value (Sheehy, Fig.4-9, Col.11, lines 36-44, where first state value change is calculated with respect to the prior state value and Fig.5, Step-205-208 describes if current verification value is equal to the former or prior verification value than in step-208 "add that former verification value to the current management data set).

Therefore, it would have been obvious to one ordinary skilled in the art to determine and reflect the affects of any overall changes in the SAN fabric in the management database as taught by Sheehy in the system of Connor (which reflect the zonal changes in the SAN environment) to overcome overall diagnostic troubleshoot limitation is SAN fabric through analyzing management database of Sheehy (Sheehy, Abstract).

- 9. As to claim 2, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the plurality of network data aggregations are defined based on zoning information (Connor, [0010], where zoning is disclosed in SAN environment).
- 10. As to claim 3, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the plurality of network data aggregations are defined

based on topology information (Connor, [0004], where topology is disclosed based on switches and devices connected in the fabric where each device can communicate with other device which can be a cross platform scenario).

- 11. Claim 4 is rejected for same rationale as applied to claim 3 above.
- 12. As to claim 5, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the operations further comprise polling agents, to gather data for the at least one data aggregation to which a current state value is to be assigned (Connor, [0024], where discovery tool has a task class which is a polling agent and generating a new task for each separate operations to be performed concurrently means each operation has a separate value which is a state value).
- 13. As to claim 6, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the operations further comprise receiving notifications from agents, to gather data for the at least one data aggregation to which a current state value is to be assigned (Connor, [0049], where task invoked by the data gatherer knowledge source 58 generates (at block 210) an entry for each discovered component for the data store 52, each entry for added component represents a current state value for that given time).
- 14. As to claim 7, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the operations further comprise assigning an initial state value for each data aggregation (Connor, [0040], where knowledge source array provide a list of initialized knowledge source).

15. As to claims 8 and 20, Connor and Sheehy discloses the invention substantially as in parent claims 1 and 19 above, including, wherein the operation of assigning a current state value to at least one of the data aggregations is performed by at least one agent discovery service (Connor, [0012], where discovery tool has a task service which performs operations e.g. detecting newly added component and generating entries for each new event).

- 16. As to claim 9, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the operation of assigning a current state value to at least one of the data aggregations is performed by a management client (Connor, Fig.2, where task is a management client).
- 17. As to claims 10 and 11, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the operation of assigning a current state value to at least one of the data aggregations comprises processing data in the at least one of the data aggregations in a prescribed order (Connor, [0042], where first in first out is a prescribed order).
- 18. As to claim 12, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein each current state value is a CRC value computed using data associated with a corresponding data aggregation, and a CRC polynomial (Sheehy, Col.3, lines 50-60, where CRC or checksum is disclosed).

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- 19. As to claim 13, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein each current state value is a checksum computed against data associated with a corresponding data aggregation.
- 20. As to claim 14, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the operations further comprise receiving data corresponding with at least one data aggregation wherein the current state value is different than a corresponding prior state value.
- 21. As to claims 15 and 16 are rejected for same rationale as applied to claim 1 above.
- 22. As to claim 17, Connor and Sheehy discloses the invention substantially as in parent claim 16, including, wherein the plurality of data aggregations includes at least one data aggregation that is a subset of a corresponding superset data aggregation (Connor, fig.1, element-8a and 8b are subset with in the Fabric where Fabric is a superset, and wherein the subset data aggregation is located in the hierarchal ordering after the corresponding superset data aggregation (Connor, Fig.1, [0020], where Storage 10a, 10b and 10c are in hierarchical order corresponding to Host 6a, 6b and 6c with in the Fabric which is a superset).
- 23. As to claim 18, Connor and Sheehy discloses the invention substantially as in parent claim 1, including, wherein the operations further comprise requesting polling on data aggregations that are subsets of a superset data aggregation that has a changed

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state value (Connor, [0011], Fig.2, where blackboard component calls the program which polls and run operations to discover changes in SAN system and reports the aggregated data to SAN management system).

- 24. Claims 22 and 25 are rejected for same rationale as applied to claim 11 above.
- 25. Claims 21 and 26 are rejected for same rationale as applied to claim 1 and 24 above.
- 26. **Examiner's Note:** Examiner has cited particular columns and line numbers in the references, as applied to the claims above for the convenience of the applicant.

  Although the specified citations are representative of the teachings of the art and are applied to the specific limitations within the individual claim, other passages and figures may apply as well. It is respectfully requested from the applicant in preparing responses, to fully consider the references in its entirety as potentially teaching of all or part of the claimed invention, as well as the context.

#### Conclusion

27. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tauqir Hussain whose telephone number is 571-270-1247. The examiner can normally be reached on 7:30 AM to 5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bunjob Jaroenchonwanit can be reached on 571 272 3913. The fax phone

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number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

TH 11/08/2007

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